

Amendments to the Claims

1. (Currently Amended) A bushing for conducting and insulating electricity comprising:
a core;
a flange securely fastened to said core; and
a housing permanently fastened directly to said core;
wherein said housing is cast in one single unitary piece.
2. (Currently Amended) A bushing according to claim 1 wherein:
said housing is ~~one unitary piece~~, having a top end and bottom end, and is permanently fastened directly to said core, continuously from the top of said housing to the bottom of said housing.
3. (Original) A bushing according to claim 2 wherein: said housing is comprised of silicone-rubber.
4. (Original) A bushing according to claim 1 wherein:
said core consists of a stud with resin-impregnated paper-foil matrix wound around said stud for increased capacitance-grading.
5. (Original) A bushing according to claim 4 wherein:
said resin-impregnated paper-foil matrix further comprising a plurality of crepe paper and foil matrix layers wound around said stud; and
an epoxy resin encapsulating said plurality of crepe paper and foil matrix layers.
6. (Original) A bushing according to claim 5 wherein:
said foil matrix is selected from a group consisting of a metal, a conductive ink, or a conductive element paper.

7. (Currently Amended) A bushing for conducting and insulating electricity according to claim 1 wherein:

said flange is further comprised of a power factor test tap for testing the power factor of said ~~apparatus~~ bushing; and

said power factor test tap is connected to said core by an electrical wire.

8. (Original) A bushing for conducting and insulating electricity according to claim 1 wherein:

said core has at least one recess for physically-mechanically attaching said housing to said core.

9. (Original) A bushing for conducting and insulating electricity according to claim 1 wherein:

said flange is further comprised of a power factor test tap for testing the power factor of said bushing; and

said power factor test tap is connected to an end of an electrical wire, and the other end of said electrical wire is connected to said core.

10. (Currently Amended) An apparatus bushing for conducting and insulating electricity comprising:

~~a core~~ a core;

a flange adapted for receiving said core, where said flange is permanently bonded to said core; and

a housing directly bonded to said core;

wherein said housing is cast in one single unitary piece.

11. (Currently Amended) An apparatus bushing for conducting and insulating electricity according to claim 10 wherein:

said housing ~~is of unitary construction~~, having a top end and a bottom end, and is permanently molded to said core.

12. (Original) An apparatus bushing for conducting and insulating electricity according to claim 11 wherein:

said housing is a rubber housing.

13. (Original) An apparatus bushing for conducting and insulating electricity according to claim 11 wherein:

said housing is comprised of silicone-rubber.

14. (Original) An apparatus bushing for conducting and insulating electricity according to claim 10 wherein:

said core is comprised of a stud around which a plurality of resin-impregnated crepe paper and foil matrix layers are wound.

15. (Currently Amended) An apparatus bushing for conducting and insulating electricity according to claim ~~10~~ 14 wherein:

said foil matrix is selected from a group consisting of metal , a conductive ink, or a conductive element paper.

16. (Original) An apparatus bushing for conducting and insulating according to claim 10 wherein:

said core has at least one recess for physically-mechanically attaching said housing to said core.

17. (Original) An apparatus bushing for conducting and insulating electricity according to claim 10 wherein:

said flange is further comprised of a power factor test tap for testing the power factor of said apparatus bushing; and

said power factor test tap is connected to an end of an electrical wire, and the other end of said electrical wire is connected to said core.

18. (Currently Amended) A bushing comprising:

a core for conducting and insulting electricity comprising a stud and a plurality of crepe paper and foil matrix layers wound around said stud and impregnated with epoxy ~~resin~~ resin;

a flange securely fastened to said core; and

a silicone-rubber housing of unitary construction, having a top and bottom end;

said ~~silicon-rubber~~ silicone-rubber housing being permanently bonded directly to said core continuously from the top of said housing to the bottom of said housing;

wherein said housing is cast in one single unitary piece.

19. (Canceled)

20. (New) The bushing of claim 18, wherein:

said housing is cast from a free-flowing, fast curing, liquid silicone rubber.

21. (New) The bushing of claim 18, further comprising:

a draw lead terminal attached to the top end of said housing.